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ABSTRACT

Although a number of studies have been conducted to examine the status attainment process, very few have focused on differences in educational attainment for black, white, and Hispanic females. The primary purpose of this study was to test predictive models of attainment for these subgroups. Variables considered potentially important to the attainment process were: (1) mother's education: (2) mother's occupation: (3) father's education: (4) father's occupation: (5) parental encouragement: (6) parental influence: (7) high school program: (8) peer influence: (9) percentile rank: (10) occupational expectation: (11) educational expectation: and (12) educational attainment. Data for the study were taken from the National Longitudinal Study of High School Class of 1972. Results of analysis showed that different patterns emerge among the racial subgroups. Further, for the subgroup of blacks, differences between males and females were indicated. In particular, the variable of educational expectations was not a significant predictor for the males. (Author/RL)

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EDUCATIONAL ATTAINMENT AMONG FEMALES
AND MINORITIES*

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**Educational Attainment Among Females and Minority Groups:
A Predictive Model Based on the National Longitudinal Study of the
Class of 1972, Third Followup**

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Although a number of studies have been conducted to examine the status attainment process, very few have focussed on differences in educational attainment for black, white, and Hispanic females. The primary purpose of this study is, therefore, to test predictive models of attainment for these subgroups. Data for the study are taken from the National Longitudinal Study of High School Class of 1972. Results of analyses show that different patterns emerge among the racial subgroups. Further, for the subgroup of blacks, differences between males and females were indicated. In particular, the variable of educational expectations was not a significant predictor for the males.

According to recent reports from the Bureau of Labor Statistics (1979), more than half of the women in the United States are currently in the work force. However, if we look more closely at the kinds of occupations in which women are employed, it appears that most women are in occupations of lower status and prestige than their male counterparts. This is especially true for women from minority groups. But why this is so is not entirely clear. A number of explanations could be offered ranging from overt discrimination by employers to conscious preference by women for lower status positions. Studies examining the attainment processes for males suggest that educational attainment has a significant effect on occupational status. It should, therefore, be of special interest to examine the process of educational attainment for young women and minorities who grew up in the sixties and seventies, a time when extended efforts were made by the federal government to increase participation of women and minorities in all avenues of life.

Since as early as Hollingshead's work (1957), there has been extensive research on educational and occupational attainment. However, much of this work cannot be generalized to populations of women and minorities in the seventies. A number of factors limit the utility of early research for the groups of interest. First, even though a considerable amount of research has been conducted, most of the status attainment models developed have been limited to white males (Blau & Duncan, 1967; Sewell, Haller & Portes, 1969; and Bachman, O'Malley & Johnston, 1978). Another limitation of the research relates to its representativeness in terms of geographical area and size; much of it uses small samples from narrow

areas (Rehberg & Westby, 1967; Kerchoff, 1975; Marini & Greenberger, 1978; and Sewell & Hauser, 1975). Finally, much of the research is based on data from the sixties and earlier (Rehberg & Westby, 1967; Turner, 1964; Blau & Duncan, 1967; and Treiman & Terrell, 1975). There have been some recent efforts studying access to postsecondary education among various subgroups (Bowers, 1977; Alexander & Eckland, 1974; and Thomas, Alexander & Eckland, 1977). Peng and Jaffee (1978) studied entrance of women into male-dominated curricula; but these recent studies employed samples of students who had been out of high school for only one year.

In summary, while women comprise almost half of the labor force in this nation, their attainment processes have not been fully understood. This research, part of a larger study on status attainment supported by the National Center for Education Statistics (Lichtman & Wolfle, 1978), is, therefore, designed to accomplish the following two main objectives:

- To examine the extent of differences in educational attainment among the subgroups black females, Hispanic females, and white females compared to their male counterparts.
- To test the efficacy of a status attainment model to predict educational attainment for females that employs a number of exogenous and intervening variables.

An Attainment Model

Status attainment is a complex process, involving the interrelationships of variables from an individual's background, such as the education and status of one's parents; the unique qualities of the individual, such as ability and motivation; and the social and psychological forces of the society in

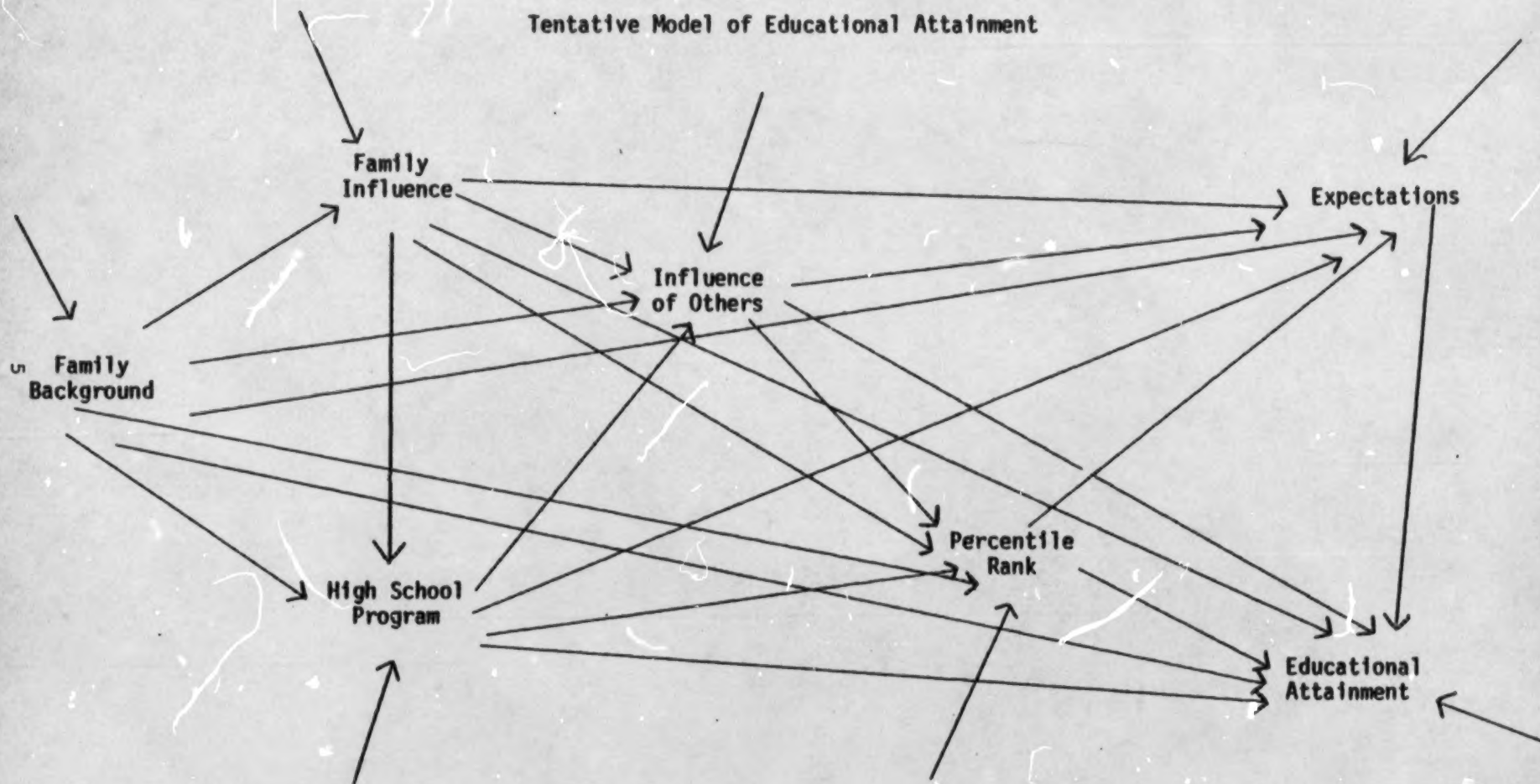
which the individual functions. Early thinking on status attainment posited a simple model looking at background variables as primary factors in attainment (Blau & Duncan, 1967 and Coleman, Campbell, Hobson, McPartland, Mood, Weinfeld, & York, 1966). As research efforts expanded, a variety of attainment models, incorporating social-psychological variables, were hypothesized. Since research on attainment among women and minorities has been limited, no one model could be tested in this research. Rather the model developed here is based on theoretical reasoning and modifications of previous research. Figure 1 presents the hypothesized model.

We recognize the potential importance of family background to the attainment process and our model incorporates the education and occupation of the father as family background indicators. Our special interest in females and minorities has led us also to examine the possible effects of the status of mothers on their daughters. Thus our family background set also includes mother's education and occupation. We have defined mother's occupation as professional or not since it is believed that what may make a difference in the aspirations of women is their role model identity. In addition to examining certain parental characteristics, our model also incorporates two variables that enable us to look more closely at the influence parents exert on their offspring.

We are particularly interested in testing whether the student's high school experience has a significant effect on her future educational attainment. In this research, three variables have been identified: the type of high school program in which the student is enrolled (academic or not), the influence of peers, and achievement (as measured by percentile rank in class). Finally, a student's expectation for her future has been shown to

FIGURE 1

Tentative Model of Educational Attainment



have considerable impact on that student's attainment. This model includes both educational and occupational expectations.

The Data

Subjects studied are respondents to the National Longitudinal Study of the High School Class of 1972 (NLS) and the three follow-up surveys conducted in 1973, 1974 and 1976. The NLS file represents a national probability sample of high school seniors (class of 1972). Data on education, work, attitudes, background and over two thousand additional variables were collected by means of questionnaires. Overall response rate to the survey was over ninety percent, resulting in a total sample of over 22,000 cases.

Variables used in this study are measured in a variety of ways. The four educational variables (educational attainment, educational expectation, mother's education and father's education) are measured on a continuum of categories from "less than high school" to "graduate or professional school." The Educational Attainment Variable, in particular, had eight categories: "finished high school;" "less than two years of vocational, trade or business school;" "two years or more of vocational, trade or business school;" "less than two years of college;" "two or more years of college (including a two year degree)," "finished college;" "Master's degree or equivalent;" and "Ph. D. or advanced professional degree."

Mother's occupation is a dichotomous variable indicating professional or not. The occupational expectation variable is measured by fourteen U. S. census code categories including such fields as clerical, professional, and sales.

The two influence variables, parental influence and peer influence, are an average of three responses to questions asking whether the significant others discussed future plans, influenced future plans, and influenced the high school program. The parental encouragement variable was an average of responses to two questions asking the levels of schooling each parent wants for the student. The categories of these responses ranged from "quitting high school" to "graduate or professional school."

The high school program is a dichotomous variable indicating academic program or otherwise. Percentile rank is the variable used as a measure of academic ability, rather than class rank, high school grades, or a direct measure of ability.

A description of the subgroups and their salient characteristics is included in Table 1. Males and females are approximately equally divided for the total sample and within racial groups. Some fourteen percent of the sample is black, slightly higher than what would be expected since blacks and low income students were oversampled in the initial sampling plan. The Hispanic group represents four percent of the total and consists of all those classified as Mexican-American, Puerto Rican and Latin American, of which the Mexican-American group is the largest.

Although total response rate to NLS is extremely high, the lack of response to particular questions is quite variable and, in some analyses, a reduction of sample size is considerable. Table 2 details frequencies for a selected number of variables in the path model by subgroup. Some caution should be used in interpretation of data from these items. Hopefully subsequent analyses will have fewer items missing, especially for certain subgroups.

TABLE 1
Summary Data on Subgroups

Sex by Race

	<u>Frequency</u>	<u>% Total</u>
White Males	8650	38
White Females	8505	38
Black Males	1369	6
Black Females	1749	8
Hispanic Males	495	2
Hispanic Females	491	2
Other Races	1100	5
Missing Data	293	1
Total	22652	100

Sex

	<u>Frequency</u>	<u>% Total</u>
Males	11336	50
Females	11167	49
Missing Data	149	1
Total	22652	100

Race

	<u>Frequency</u>	<u>% Total</u>
Whites	17159	76
Blacks	3119	14
Hispanics	986	4
Other	1100	5
Missing Data	288	1
Total	22652	100

TABLE 2

Frequencies and Percentages Responding for Selected Variables by Subgroups

N	Subgroup	Educational Attainment		Mother's Occupation		Mother's Education		Father's Education		Educational Expectations		Occupational Expectations	
		f	%	f	%	f	%	f	%	f	%	f	%
8650	White Males	7658	89	5318	61	8456	98	8446	98	4991	58	5062	59
8505	White Females	7722	91	5575	66	8403	99	8388	99	5151	61	5362	63
1369	Black Males	1106	81	528	39	1310	96	1280	93	448	33	405	30
1749	Black Females	1530	87	793	45	1686	96	1654	95	661	38	673	38
495	Hispanic Males	409	83	275	56	478	97	477	96	229	46	227	45
491	Hispanic Females	407	83	306	62	476	97	474	97	229	47	259	53

Analysis and Results

Data analysis involves descriptive procedures (means and cross tabs), intercorrelation matrices, and the generation of path models through linear regression procedures. A path model to predict educational attainment is estimated for six subgroups: white females, black females, Hispanic females and their male counterparts.

Table 3 reports educational attainment of the subgroups four and one-half years after high school graduation. These data show that a greater percentage of whites (both males and females) complete college than do blacks or Hispanics. Similarly, the percentage of Hispanics completing college for both males and females is only four and five percent respectively. However, of considerable interest is the college completion rate for white and black females. For the white females, the figure of 18 per cent completing is considerably higher than what one would have expected based on other data. Nor is it to be expected that a larger percentage of white women than men would have completed four years of college. Also of interest is the high completion rate (12 percent) for black females. These data also appear higher than those from other sources. However, it is possible that more men than women may continue to complete college, or that men take a longer time than women to complete college.

An examination of the category "Some College"--a conglomerate both of academic and vocational experiences with varying number of years in programs--is also illuminating. For each subgroup more than half of the respondents continued on after high school for some form of higher education.

One caution must be noted in interpretation of these and other data in this set. First, by design the population from which the sample was drawn

TABLE 3
Educational Attainment by Subgroups
(Reported in 1976)

	<u>High School Graduate</u>		<u>Some College (Vocational or Academic)</u>		<u>Complete College</u>		<u>Totals*</u>
	f	%	f	%	f	%	
White Males	2588	34	3843	50	1227	16	7658
White Females	2936	38	3415	44	1371	18	7722
Black Males	489	44	531	48	86	8	1106
Black Females	597	39	754	49	179	12	1530
Hispanic Males	180	44	211	52	18	4	409
Hispanic Females	193	47	192	47	22	5	407

*These totals represent a range of 81 to 91 percent response of total sample for each subgroup.

was limited to those students enrolled as high school seniors, class of 1972. Thus any students who dropped out of school prior to their senior year were not included in this sample. Thus it is only reasonable to generalize from these data for those students who continue in high school until their senior year.

To gain additional insight, we can examine the educational expectations the respondents had as they completed their senior year in high school (Table 4). Among the women, approximately half of the blacks, forty-four percent of the whites and thirty-eight percent of the Hispanics expect to complete college or graduate school. An additional one third or more of each of the groups expects to attend some college. Contrast this to the actual 1976 attainment. The greatest discrepancy seems to be among the Hispanic women who had an attainment rate of five percent in contrast to over one-third expected to complete. Of course it may be too early to reach firm conclusions since only four years had elapsed since high school completion and education may have been interrupted rather than terminated.

To identify factors that relate to the differences in educational attainment as described above, and to gain understanding of the process for each subgroup, correlational analysis as well as path analysis were employed. Tables 5, 6 and 7 present the intercorrelational coefficients and Tables 8, 9 and 10 present the model parameter estimates or standardized partial regression coefficients. Based on these results, a number of interesting findings are summarized as follows.

TABLE 4
Expected Educational Attainment by Subgroups
(Reported in 1972)

	High School Graduate*		Some College (Vocational or Academic)		Complete College		Totals*
	f	%	f	%	f	%	
White Males	783	16	1439	29	2769	55	4991
White Females	1214	24	1662	32	2275	44	5151
Black Males	72	16	145	32	231	52	448
Black Females	94	14	233	35	334	51	661
Hispanic Males	32	14	81	35	116	51	229
Hispanic Females	41	18	100	44	88	38	229

*Includes those who do not expect to complete high school.

Table 5
TWELVE VARIABLE ZERO ORDER CORRELATION MATRIX
BLACK FEMALES AND MALES

	A	B	C	D	E	F	G	H	I	J	K	L
A) Mother's Education	—	.50* (.56*)	.49* (.51*)	.34* (.33*)	.28* (.30*)	-.05 (.02)	.18* (.15*)	-.06* (-.08*)	.05 (.07*)	.08* (.13*)	.25* (.25*)	.18* (.22*)
B) Mother's Occupation		—	.31* (.30*)	.20* (.33*)	.18* (.21*)	-.01 (-.03)	.08* (.13*)	-.02 (-.10*)	.05 (-.00)	.04 (.08)	.21* (.14*)	.14* (.21*)
C) Father's Education			—	.45* (.45*)	.25* (.27*)	-.01 (.00)	.15* (.15*)	-.01 (-.04)	.05 (.02)	.17* (.12*)	.31* (.22*)	.17* (.21*)
D) Father's Occupation				—	.22* (.31*)	.01 (.04)	.14* (.12*)	.03 (-.06)	-.01 (.03)	.08 (.07)	.25* (.25*)	.17* (.21*)
E) Parental Encouragement					—	.00 (.05)	.36* (.25*)	-.05 (-.04)	.21* (.27*)	.38* (.48*)	.63* (.54*)	.46* (.42*)
F) Parental Influence						—	-.04 (.01)	.23* (.23*)	-.04 (-.06)	-.02 (-.09)	.08* (.00)	-.03 (.00)
G) High School Program							—	-.11* (-.06*)	.24* (.24*)	.35* (.24*)	.41* (.27*)	.38* (.31*)
H) Peer Influence								—	-.08* (-.07)	-.11* (-.02)	-.10* (.03)	-.07* (-.00)
I) Percentile Rank									—	.24* (.23*)	.34* (.22*)	.34* (.34*)
J) Occupational Expectation										—	.43* (.44*)	.37* (.42*)
K) Educational Expectation											—	.53* (.41*)
L) Educational Attainment												—

Table 6
TWELVE VARIABLE ZERO ORDER CORRELATION MATRIX
HISPANIC FEMALES AND MALES

	A	B	C	D	E	F	G	H	I	J	K	L
A) Mother's Education	—	37* (36*)	62* (58*)	37* (42*)	14* (11*)	-04 (-04)	22* (10*)	-13* (-07)	00 (04)	08 (08)	07 (16*)	10* (C3)
B) Mother's Occupation		—	29* (27*)	30* (18*)	11 (11)	-12* (-07)	14* (03)	-05 (-08)	-05 (14*)	01 (16*)	-01 (07)	05 (01)
C) Father's Education			—	54* (60*)	24* (15*)	-07 (-01)	23* (12)	-12* (-10*)	08 (05)	17* (09*)	10 (19*)	15* (08)
D) Father's Occupation				—	12* (11)	-03 (01)	15* (17*)	-10 (-02)	14* (09)	06 (13)	-04 (12)	04 (08)
E) Parental Encouragement					—	11* (04)	40* (39*)	02 (03)	33* (30*)	49* (44*)	65* (72*)	41* (45*)
F) Parental Influence						—	15* (15*)	13* (30*)	-09 (15*)	02 (00)	03 (08)	-00 (08)
G) High School Program							—	15* (01)	34* (31*)	38* (26*)	48* (43*)	46* (38*)
H) Peer Influence								—	-05 (03)	03 (12)	01 (02)	05 (-03)
I) Percentile Rank									—	32* (36*)	44* (40*)	38* (43*)
J) Occupational Expectation										—	56* (44*)	34* (39*)
K) Educational Expectation											—	63* (55*)
L) Educational Attainment												—

Table 7
TWELVE VARIABLE ZERO ORDER CORRELATION MATRIX
WHITE FEMALES AND MALES

	A	B	C	D	E	F	G	H	I	J	K	L
A) Mother's Education	—	.49* (.46*)	.50* (.53*)	.35* (.35*)	.38* (.30*)	.11* (.11*)	.27* (.23*)	.01 (-.00)	.15* (.15*)	.26* (.22*)	.34* (.31*)	.36* (.29*)
B) Mother's Occupation		—	.20* (.22*)	.14* (.14*)	.19* (.12*)	.05* (.06*)	.12* (.11*)	-.01 (-.01)	.07* (.07*)	.15* (.10*)	.18* (.12*)	.17* (.12*)
C) Father's Education			—	.57* (.56*)	.39* (.39*)	.10* (.13*)	.28* (.27*)	-.01 (.01)	.14* (.19*)	.25* (.24*)	.37* (.38*)	.37* (.37*)
D) Father's Occupation				—	.31* (.32*)	.10* (.11*)	.22* (.22*)	-.02 (.00)	.11* (.13*)	.18* (.22*)	.29* (.31*)	.28* (.28*)
E) Parental Encouragement					—	.17* (.18*)	.51* (.50*)	.02 (.01)	.36* (.42*)	.53* (.50*)	.75* (.76*)	.64* (.58*)
F) Parental Influence						—	.16* (.20*)	.18* (.19*)	.10* (.14*)	.10* (.12*)	.18* (.24*)	.19* (.20*)
G) High School Program							—	-.00 (.01)	.36* (.41*)	.47* (.39*)	.54* (.53*)	.51* (.50*)
H) Peer Influence								—	-.03* (-.02)	-.02 (-.02)	.02 (.01)	-.00 (-.00)
I) Percentile Rank									—	.27* (.34*)	.40* (.46*)	.41* (.47*)
J) Occupational Expectation										—	.59* (.55*)	.53* (.45*)
K) Educational Expectation											—	.71* (.65*)
L) Educational Attainment												—

TABLE 8
EFFECTS OF FAMILY BACKGROUND, INFLUENCE OF OTHERS,
HIGH SCHOOL PROGRAM CHARACTERISTICS AND EXPECTATIONS ON EDUCATIONAL ATTAINMENT
BLACK FEMALES AND MALES

Dependent Variables	Predetermined Variables											R ²
	A	B	C	D	E	F	G	H	I	J	K	
A) Mother's Education												
B) Mother's Occupation												
C) Father's Education												
D) Father's Occupation												
E) Parental Encouragement	.14 (.22)	.04 (-.03)	.23* (.05)	.01 (.28*)		.05 (.10)						.12 (.20)
F) Parental Influence	-.24* (-.07)	.04 (-.11)	.06 (-.09)	.05 (.06)	.06 (.12)							.03 (.04)
G) High School Program	-.03 (.07)	.06 (-.04)	-.11 (.02)	.15* (-.08)	.34* (.30*)	-.03 (.03)		-.04 (.06)				.14 (.10)
H) Peer Influence	-.05 (-.03)	.06 (-.35*)	-.01 (-.11)	.07 (.19)	-.04 (.06)	.12 (.03)	-.05 (.06)					.02 (.15)
I) Percentile Rank	.00 (.08)	.03 (.08)	-.12 (.06)	-.03 (-.15)	.24* (.15)	-.03 (.11)	.13* (.17)	-.10 (.15)				.11 (.12)
J) Occupational Expectation	-.02 (-.05)	-.04 (.12)	.04 (-.13)	-.03 (-.06)	.12 (.47*)	.12* (-.24*)	.15* (.14)	.03 (-.04)	.08 (.13)		.37* (.08)	.34 (.40)
K) Educational Expectation	-.10 (.19*)	.12* (-.05)	.08 (-.02)	-.01 (-.08)	.49* (.53*)	.03 (.03)	.12* (.12)	-.04 (-.05)	.12* (.18*)	.24* (.07)		.57 (.52)
L) Educational Attainment	.06 (.09)	-.02 (.04)	.01 (.05)	.03 (.07)	.09 (.23*)	-.11* (.13)	.05 (.15)	-.02 (.01)	.11* (.01)	.16* (.20*)	.42* (.10)	.47 (.40)

Standardized Regression
Coefficients

24

Males in parentheses below females
Decimals omitted

*p < .05

Males N= 111

Females N= 220

25

TABLE 9
EFFECTS OF FAMILY BACKGROUND, INFLUENCE OF OTHERS,
HIGH SCHOOL PROGRAM CHARACTERISTICS AND EXPECTATIONS ON EDUCATIONAL ATTAINMENT

HISPANIC FEMALES AND MALES

Dependent Variables	Predetermined Variables											R ²
	A	B	C	D	E	F	G	H	I	J	K	
) Mother's Education												
) Mother's Occupation												
) Father's Education												
) Father's Occupation												
) Parental Encouragement	.08 (.10)	-.08 (.11)	.13 (.02)	.25* (-.04)		.08 (.22*)						.13 (.19)
) Parental Influence	-.01 (-.01)	-.14 (-.05)	-.12 (.05)	.03 (.03)	.09 (.22*)							.05 (.05)
) High School Program	.06 (.05)	-.02 (.12)	.29* (-.03)	.08 (.02)	.28* (.43*)	.27* (.21*)		-.06 (.01)				.33 (.30)
) Peer Influence	-.03 (-.05)	.12 (-.07)	-.04 (.01)	-.00 (.07)	.05 (.04)	.15 (.07)	-.10 (-.01)					.03 (.02)
) Percentile Rank	-.20 (-.07)	.06 (.19)	-.10 (-.07)	-.00 (-.02)	.20 (.26)	-.23* (-.04)	.33* (.19)	-.00 (.06)				.18 (.20)
) Occupational Expectation	-.23* (.01)	.04 (.10)	.11 (-.06)	-.05 (.09)	.16 (-.08)	-.08 (-.12)	-.23* (.07)	.08 (.10)	.11 (.16)		.44* (.41*)	.55 (.27)
) Educational Expectation	-.04 (-.04)	.04 (.02)	.04 (.03)	-.10 (-.04)	.36* (.64*)	-.05 (.01)	.08 (.04)	-.02 (-.02)	.02 (.17*)	.44* (.18*)		.55 (.67)
) Educational Attainment	-.12 (-.07)	.01 (.03)	.15 (.13)	-.01 (-.11)	.05 (.00)	-.11 (.02)	.40* (.03)	.04 (.02)	.22* (.25*)	-.09 (.03)	.34* (.45*)	.51 (.45)

Standardized Regression
Coefficients

Males in parentheses below females
Decimals omitted

*p < .05

Males N= 96

Females N= 94 27

TABLE 10
EFFECTS OF FAMILY BACKGROUND, INFLUENCE OF OTHERS,
HIGH SCHOOL PROGRAM CHARACTERISTICS AND EXPECTATIONS ON EDUCATIONAL ATTAINMENT
WHITE FEMALES AND MALES

Dependent Variables	Predetermined Variables											R ²
	A	B	C	D	E	F	G	H	I	J	K	
A) Mother's Education												
B) Mother's Occupation												
C) Father's Education												
D) Father's Occupation												
E) Parental Encouragement	20* (11*)	03 (-00)	21* (23*)	10* (12*)		11* (15*)						21 (18)
F) Parental Influence	06* (01)	-01 (01)	00 (06)	03 (04)	13* (17*)							03 (05)
G) High School Program	05* (04*)	-02 (02)	04 (01)	02 (03)	45* (44*)	11* (13*)		-04* (-01)				27 (26)
H) Peer Influence	02 (01)	-00 (-02)	-04 (-01)	-02 (-01)	04 (00)	21* (16*)	-06* (-02)					05 (02)
I) Percentile Rank	04 (-01)	00 (01)	-02 (04)	05* (-05*)	25* (29*)	02 (06*)	22* (25*)	-05* (-03)				17 (23)
J) Occupational Expectation	03 (05*)	02 (00)	-01 (-02)	-04* (03)	13* (17*)	01 (-01)	16* (04*)	-02 (-04*)	-00 (06*)		41* (35*)	38 (32)
K) Educational Expectation	02 (01)	00 (-01)	03* (04*)	02 (01)	51* (53*)	03* (04*)	12* (14*)	-00 (-02)	08* (12*)	23* (18*)		65 (67)
L) Educational Attainment	07* (04*)	-01 (-01)	04* (09*)	01 (00)	15* (09*)	06 (01)	08* (12*)	00 (01)	12* (20*)	13* (05*)	38* (33*)	58 (48)

Standardized Regression Coefficients

28

Males in parentheses below females
Decimals omitted

*p < .05

Males N= 2699 Females N= 3010

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The eleven variable intercorrelation matrix for white females reveals five variables correlating above .40 with educational attainment. They are educational expectation (.71), parental encouragement (.64), occupational expectation (.53), type of high school program (.51), and percentile rank (.41). The path model using the eleven variable set of predictors accounts for 58 percent of the variance. Of these, educational expectation ($b=.38$), occupational expectation ($b=.13$), parental encouragement ($b=.15$), percentage rank ($b=.12$), type of high school program ($b=.08$), and education of parents (father's, $b=.07$ and mother's, $b=.04$), all make significant contributions to the total R^2 .

The eleven variable intercorrelation matrix for black females indicates only two variables with correlations above .40 as related to achievement. These are educational expectation (.53) and parental encouragement (.46). As in the other patterns, educational expectation has the highest correlation with attainment. Forty-seven percent of the variance in educational attainment can be predicted from educational expectation ($b=.42$), occupational expectation ($b=.16$), percentile rank ($b=.11$) and parental influence ($b=-.11$).

For the Hispanic female sample, three variables have a correlation of .40 or higher with attainment. These are educational expectation (.63), type of high school program (.46), and parental encouragement (.41). The multiple regression partially confirms these correlations. Eleven variables accounted for an R^2 of .51. Of these, the significant three appear to be educational expectation ($b=.34$), type of high school program ($b=.40$) and percentile rank ($b=.22$). The effect of parental encouragement is mediated through high school program and educational expectation.

The zero order correlation matrix for black males reveals a similar pattern as for the other groups. Three variables have a correlation with

educational attainment above .40: educational expectations (.41); occupational expectations (.42) and parental encouragement (.42). The multiple regression equation suggests that the eleven variable model is not the best fit model for predicting attainment. The eleven variables account for only 40 percent of the variance in educational attainment. The two variables with significant standardized b values are occupational expectation ($b=.20$) and parental encouragement ($b=.23$). It is of interest that educational expectation, a powerful predictor for other subgroups, does not seem important here. But caution must be used in that a considerable portion of the available sample has been eliminated from the analysis due to missing data.

Looking separately at Hispanic males, it can be seen that the correlation matrix has considerably fewer significant correlations; however the considerably smaller sample size for this subgroup results in this phenomenon. It is interesting to note that educational expectation (.55), parental encouragement (.45) and percentile rank (.43) are all correlated .40 or higher with attainment. The multiple regression indicates that the eleven variables account for 44 percent of the variance with educational expectations and percentile rank being the only two variables with significant contributions (educational expectation standardized $b=.45$; percentile rank standardized $b=.25$). The impact of father's education is mostly mediated through high school program.

While meaningful comparisons among variables within each subgroup using standardized beta weights can be made, it is also valuable to compare among groups using unstandardized b values. Table 11 reports these for the educational attainment variable only for each of the three female subgroups.

TABLE 11
Predicting Educational Attainment
Partial Regression Weights

	White N=3010	Black N=220	Hispanic N=94
Mother's Education	.14*	.11	-.28
Mother's Occupation	-.06	-.10	.09
Father's Education	.07*	.02	.28
Father's Occupation	.00	.00	-.00
Parental Encouragement	.26*	.16	.07
Parental Influence	.28*	-.49*	-.45
High School Program	.32*	.20	.47*
Peer Influence	.02	-.07	.13
Percentile Rank	.01*	.01*	.01*
Occupational Expectations	.52*	.64*	-.34
Educational Expectations	.57*	.68*	.51*
R ²	.58	.47	.51

*p < .05

Data provided in Table 11 further suggest that different attainment processes appear for different racial groups. Here, too, it can be seen that eight of the eleven predicted variables have a direct effect on the educational attainment of white females. For white females, effects of parental education, encouragement and influence are all significant. In contrast, parental influence has a negative effect for black females and no effect for the Hispanic women. Nor do any of the other family background variables have significant effects for black or Hispanic women.

In terms of educational experiences, the type of high school program in which the student matriculated had a positive effect both for whites and Hispanics, but no effect for the black women. Another difference is observed regarding the effect of occupational expectation which was significant for whites and blacks, but not for Hispanics.

Discussion

If we look first at the actual educational attainment of the various subgroups, as expected we find that more whites than blacks actually completed college. These findings support figures reported for college enrollment. However, actual attainment for white and black females is higher than what would be expected. Since the group was studied only four years after their high school graduation, it may be too early to tell how many others will complete college in the future. If their expectations for completion are at all fulfilled, many more would be expected to complete.

Findings regarding the process of status attainment among three racial groups and between males and females within racial groups suggest that the attainment process for the groups appears to be different. The hypothesized status attainment model that predicts educational attainment based on family

background characteristics, the influence of the family and significant others, the type of high school program and student's performance based on percentile rank, and educational and occupational expectations, appears to be most applicable to white males and females. This eleven variable model predicted a considerable portion of the variance in educational attainment for white females and males. Each variable in the model, with the exception of mother's occupation, had a significant direct effect on attainment or was mediated through other variables. Although mother's occupation was not significant in this study, it may be that the dichotomous classification of professional or not was an inappropriate way in which to get at the effects on females of a positive role model. It is also possible since so few of the mothers were classified as professional, that this effect would not be observable in this sample.

If we test the same model on the sample of black males and females, a different pattern emerges. Although accounting for somewhat less of the variance for females and males, the variables in the model are not as good predictors. Family background variables are not significant predictors for either males or females, although the influence of the mother's education and occupation is mediated through educational expectation. For females, the best predictors are educational expectation, occupational expectation, percentile rank, and a negative parental influence. For the male group, only two variables have a direct effect on educational attainment: occupational expectation and parental encouragement. Based on this sample, it seems clear that status attainment models as hypothesized are less appropriate than other potential models. We need to examine further why family background has no direct effect on the process of educational attain-

ment. It may be that the achievement of high status occupations through high educational achievement represents the "great American dream" only for those in the majority culture. Most surprising is the lack of an effect of educational expectation either on educational attainment directly or on occupational expectations for this group of black males. In all other models of attainment tested in this research, educational expectation had a high positive correlation with attainment and was highly predictive of attainment. The process seems least well understood for the black males since so few of the variables in the model were good predictors.

Although the model predicts a considerable amount of the variance in educational attainment for the Hispanic females and somewhat less for the males, only two variables--educational expectation and percentile rank--were directly related to attainment. As in the case of the blacks, the effects of parental education and occupation were minimal. Occupational expectation was mediated through educational expectation.

We can conclude that the process of status attainment appears to be different for the racial groups studied, supporting research by Thomas, Alexander and Eckland (1977) and Porter (1974). But Trieman's and Terrell's (1975) findings and research by Antos and Mellow (1978) concluding that there are not sex differences in the process of educational attainment may need to be tested further. Additional research based on samples of women just entering the occupational sphere may yield results different from those found previously. It would be expected that new models can be developed for minority groups and women that contain additional variables that will be related to attainment. Such variables as sex role orientations, marital status and current family structure, as well as school-related variables may be fruitful.

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